

SONY®

NTSC/PAL

Color Video Cameras

SSC-E450 Series



SSC-E453
SSC-E453P
SSC-E458P





Sony SSC-E450 Series – Offering Outstanding Picture Quality at an Affordable Price!

The SSC-E453/E453P/E458P Color Video Cameras are the latest additions to the Sony surveillance video camera lineup. Incorporating a newly developed 1/3-type CCD with SuperExwave™ technology allows these cameras to achieve extremely high sensitivity levels, and utilizing Sony's newly developed Digital Signal Processing (DSP) technology, allows the cameras to attain a high horizontal resolution of 540 TV lines.*

The newly developed CCD imager offers a minimum illumination of 0.55 lx and an excellent signal-to-noise (S/N) ratio of more than 50 dB, allowing these cameras to reproduce amazingly clear and detailed images.

With excellent picture quality, sophisticated features, and a stylish new design, the SSC-E450 Series is the ideal solution for a wide range of surveillance applications in locations such as retail stores, offices, banks, and more!

* The SSC-E453 is intended for use in NTSC areas, the SSC-E453P and E458P are for use in PAL areas.

FEATURES

Superb Picture Quality

State-of-the-Art SuperExwave™ CCD Technology

The SSC-E450 Series incorporates a newly developed 1/3-type CCD with SuperExwave technology that achieves extremely high sensitivity levels and produces high-quality images. This CCD imager provides a minimum illumination of 0.55 lx at F1.2, enabling the cameras to capture clear and detailed images even under low light conditions. What's more, these cameras reproduce images with a high picture quality of 380,000 pixels (SSC-E453) / 440,000 pixels (SSC-E453P/E458P) and have an excellent S/N ratio of more than 50 dB.

Innovative DSP Technology

Unlike conventional DSPs, the newly developed DSP technology employed in these cameras increases the horizontal resolution attainable by the CCD. Thanks to a combination of this DSP technology and the SuperExwave CCD technology, these cameras offer a high horizontal resolution of 540 TV lines, providing amazingly clear and detailed images.

Slim and Stylish Design

These slim and lightweight color cameras can easily be installed in places where space is limited and where installation was previously difficult for larger cameras. A stylish rear panel cover and transparent lens cap come as standard on these cameras, so they will not detract from the natural decor of the room in which they are installed.



Wide Auto Tracing White (ATW) Range

ATW is a feature that automatically adjusts the camera's white balance to adapt to changing light conditions. The SSC-E450 Series provides an extremely wide ATW range of 2,000 K to 10,000 K, allowing adjustment-free operation under a variety of light conditions. Users can choose from two modes: ATW Pro and ATW. ATW Pro mode is particularly suited to applications where the operator needs to see objects as they appear to the eye. This ensures that a precise color image is always obtained.

Turbo AGC

The SSC-E450 Series cameras are equipped with an advanced Turbo AGC function. This allows the user to boost camera gain up to 24 dB, enabling viewers of the image to distinguish the subject more easily - even if it is shot in low light. The AGC mode is selectable between OFF and TURBO.

Back-Light Compensation (BLC)

Unwanted backlighting can often cause the subject matter of an image to be cast into shadow. The BLC function incorporated in these cameras automatically compensates for such conditions and allows the subject to be more visible.

CCD IRIS

The CCD IRIS function allows the use of a manual iris lens instead of a more costly automatic iris lens. As the image brightness increases, the camera adjusts the exposure by automatically reducing the CCD photo sensor's exposure time (charge accumulation time). This is achieved by using the CCD electronics shutter, which has a range of 1/60 (NTSC) / 1/50 (PAL) to 1/100,000 second.

Other Convenient Features

DC-Servo Lens Connection Capability

The SSC-E450 Series cameras support the widely available DC-servo lenses.

CS-Mount

These cameras are equipped with a CS-mount, which provides compatibility with industry-standard CS-mount lenses.

AC 24 V/DC 12 V Operation

The SSC-E453 and SSC-E453P accept both AC 24 V and DC 12 V power sources, and will automatically switch to the appropriate mode upon receiving power.

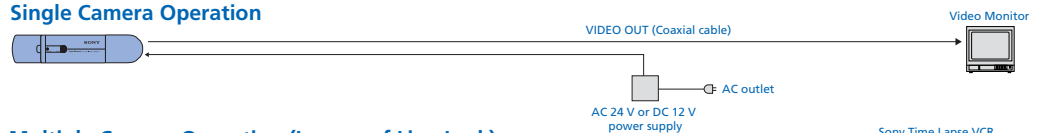
Sync System

The sync system of these cameras can be switched between internal lock and AC-line lock. When AC-line lock is selected, the V-phase can be adjusted by $\pm 90^\circ\text{C}$.

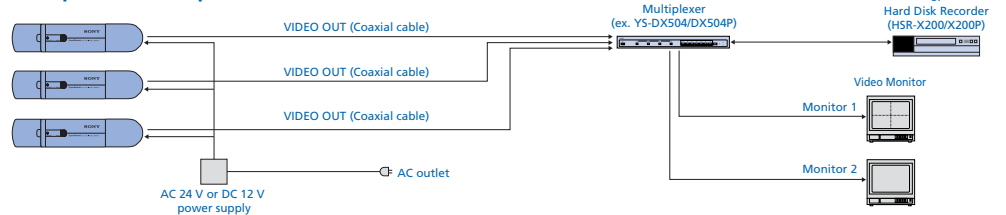
SYSTEM CONFIGURATIONS

SSC-E453/E453P

Single Camera Operation



Multiple Camera Operation (In case of Line Lock)

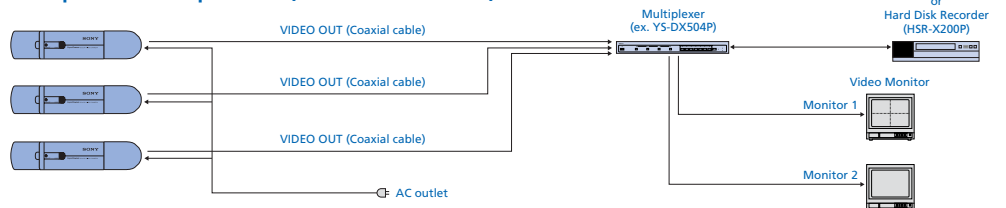


SSC-E458P

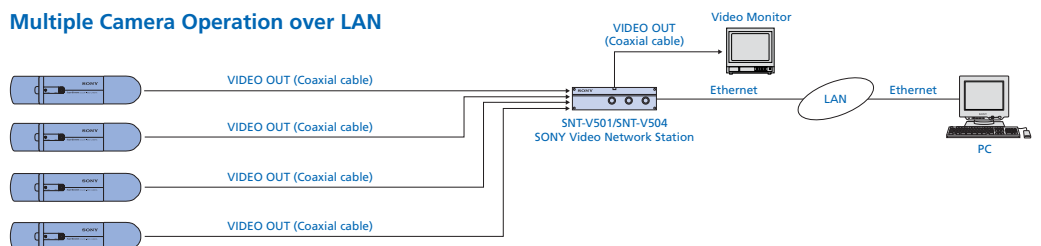
Single Camera Operation



Multiple Camera Operation (In case of Line Lock)



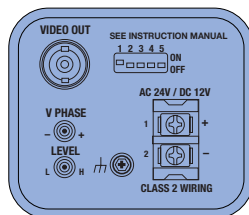
SSC-E453/E453P/E458P Multiple Camera Operation over LAN



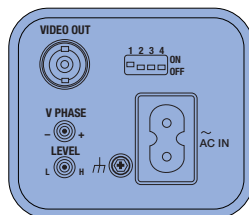
SPECIFICATIONS

	SSC-E453	SSC-E453P	SSC-E458P
Image device	1/3 type Interline Transfer CCD with SuperExwave		
Picture elements (H x V)	768 x 494 (NTSC)	752 x 582 (PAL)	
Sensing area	1/3 type format (4.8 x 3.6 mm)		
Signal system	NTSC standard	PAL standard	
Sync system	INT/Line Lock		
Horizontal resolution	540 TV lines		
Lens mount	CS		
Minimum illumination	0.55 lx at F1.2 (50 IRE, AGC ON, Turbo mode)		
AGC	TURBO/OFF switchable		
CCD IRIS	ON/OFF switchable, 1/60 to 1/100,000 s	ON/OFF switchable, 1/50 to 1/100,000 s	
White Balance (WB)	Auto White Balance Pro (ATW Pro) /Auto White Balance (ATW)		
Back-Light Compensation (BLC)	ON/OFF switchable		
S/N ratio	More than 50 dB (AGC OFF, WEIGHT ON)		
Video out	BNC, 1.0 Vp-p, 75 Ω, sync negative		
Auto iris lens	DC servo		
Operating temperature	-10 °C to 50 °C (14 °F to 122 °F)		
Storage temperature	-40 °C to 60 °C (-40 °F to 140 °F)		
Power requirements	AC 24 V ±10%, 60 Hz or DC 12 V ±10%	AC 24 V ±10%, 50 Hz or DC 12 V ±10%	AC 220 V to 240 V ±10%, 50 Hz
Power consumption	3.5 W		
Mass	360 g (12 oz) 440 g (15 oz)* including front and rear covers		390 g (13 oz) 470 g (1 lb)* including front and rear covers
Dimensions (W x H x D)	60 x 53 x 118 mm (2 3/8 x 2 1/8 x 4 3/4 inches) 60 x 53 x 240 mm (2 3/8 x 2 1/8 x 9 1/2 inches)* including front and rear covers		
Supplied accessories	Lens mount cap (1), Operating instructions (1), Front cover (1), Rear cover (1), Screws (2)		Lens mount cap (1), Operating instructions (1), Front cover (1), Rear cover (1), Screws (2), Power cable (1)

Rear View

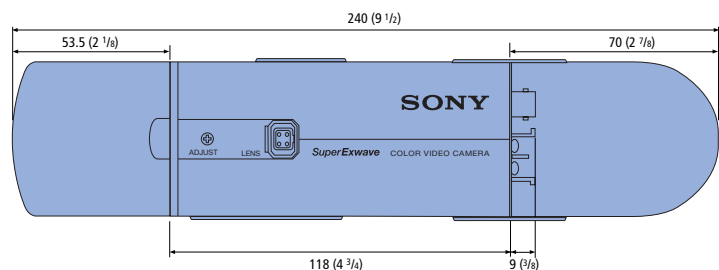
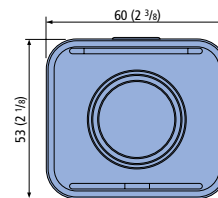


SSC-E453/E453P



SSC-E458P

Dimensions



Unit: mm (inches)

Distributed by

©2004 Sony Corporation. All rights reserved.
 Reproduction in whole or in part without written permission is prohibited.
 Design, features and specifications are subject to change without notice.
 All non-metric weights and measures are approximate.
 Sony is a registered trademark of Sony Corporation.
 SuperExwave is a trademark of Sony Corporation.